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10/502,045	01/10/2005	Atsushi Kudo	255291US90PCT	2143

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EXAMINER	
YOUNG, NATASHA E	
ART UNIT	**PAPER NUMBER**
1709	

NOTIFICATION DATE	DELIVERY MODE
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

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Office Action Summary	Application No.	Applicant(s)	
	10/502,045	KUDO ET AL.	
	Examiner	Art Unit	
	Natasha Young	1709	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *24 July 2004*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-21* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-21* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *24 July 2004* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☒ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date *See Continuation Sheet*.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

Continuation of Attachment(s) 3). Information Disclosure Statement(s) (PTO/SB/08), Paper No(s)/Mail Date :05/30/2007, 11/30/2006, 11/15/2006, 04/28/2006, 05/20/2005, 05/18/2005, 02/17/2005, 10/26/2004.

DETAILED ACTION

Specification

Applicant is reminded of the proper language and format for an abstract of the disclosure.

The abstract should be in narrative form and generally limited to a single paragraph on a separate sheet within the range of 50 to 150 words. It is important that the abstract not exceed 150 words in length since the space provided for the abstract on the computer tape used by the printer is limited. The form and legal phraseology often used in patent claims, such as "means" and "said," should be avoided. The abstract should describe the disclosure sufficiently to assist readers in deciding whether there is a need for consulting the full patent text for details.

The language should be clear and concise and should not repeat information given in the title. It should avoid using phrases which can be implied, such as, "The disclosure concerns," "The disclosure defined by this invention," "The disclosure describes," etc.

The abstract of the disclosure is objected to because it is more than one paragraph in length and the number of words exceeds 150. Correction is required. See MPEP § 608.01(b).

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 7-8 and 13-14 are rejected under 35 U.S.C. 102(b) as being anticipated by Ito et al (EP 0 361 883 A1).

Regarding claim 7, the Ito et al reference teaches an adhesive comprising: a material that is capable of forming independent pores (see page 3, 4th paragraph).

Claim 8 depends on claim 7 and will use the same reasoning to reject the dependent portion of the claim.

Regarding claim 8, the Ito et al reference teaches the adhesive according to claim 7, wherein the material is capable of forming independent pores is made from at least one material selected from the group consisting of a foaming agent, inorganic balloons and organic balloons (see page 3, 4th paragraph).

Regarding claim 13, the Ito et al reference teaches a coating material comprising: a material that is capable of forming independent pores (see Abstract, page 2, 10th paragraph, and page 3, 4th paragraph).

Regarding claim 14, the Ito et al reference teaches the coating material according to claim 13, wherein the material that is capable of forming independent pores is made from at least one material selected from the group consisting of a foaming agent, inorganic balloons and organic balloons (see Abstract; page 2, 10th paragraph; and page 3, 4th paragraph).

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

The factual inquiries set forth in *Graham* **v.** *John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

Claims 1-3, 9-12, and 15-21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Naruse et al (US 5,914,187 in view of Ito et al (EP 0 362 883 A1).

Regarding claim 1, Naruse et al teaches a honeycomb filter for purifying exhaust gases which has a structure in which: a plurality of a columnar porous ceramic member are combined with one another through adhesive layer, each of said columnar porous ceramic member comprising a number of through holes that are placed in parallel with

one another in the length direction with partition wall interposed therebetween; and said partition wall which separates said through holes functions as a filter for collecting particulates (see Abstract and column 7, 4th paragraph).

The Naruse reference does not teach a honeycomb filter wherein the relationship between a thermal expansion coefficient α_L of said adhesive layer and a thermal expansion coefficient α_F of said porous ceramic number is as follows:

$$0.01 < \frac{|\alpha_L - \alpha_F|}{\alpha_F} < 1.0.$$

The Ito et al reference does teach a honeycomb filter wherein the relationship between a thermal expansion coefficient α_L of said adhesive layer and a thermal expansion coefficient α_F of said porous ceramic number is as follows:

$$0.01 < \frac{|\alpha_L - \alpha_F|}{\alpha_F} < 1.0,$$ (see table 1).

It would have been obvious to one having ordinary skill in the art to modify the teachings of Naruse et al with the teachings of Ito et al to prevent stress concentration upon the bonded portions and for thermal shock resistance (see Ito et al reference page 2, 11th paragraph).

Regarding claim 2, The Naruse et al reference teaches a honeycomb filter for purifying exhaust gases which has a structure in which: a plurality of a columnar porous ceramic member are combined with one another through adhesive layer, each of said columnar porous ceramic member comprising a number of through holes that are placed in parallel with one another in the length direction with partition wall interposed

one another in the length direction with partition wall interposed therebetween; and said partition wall which separates said through holes functions as a filter for collecting particulates (see Abstract and column 7, 4th paragraph).

The Naruse reference does not teach a honeycomb filter wherein the relationship between a thermal expansion coefficient α_L of said adhesive layer and a thermal expansion coefficient α_F of said porous ceramic number is as follows:

$$0.01 < \frac{|\alpha_L - \alpha_F|}{\alpha_F} < 1.0 .$$

The Ito et al reference does teach a honeycomb filter wherein the relationship between a thermal expansion coefficient α_L of said adhesive layer and a thermal expansion coefficient α_F of said porous ceramic number is as follows:

$$0.01 < \frac{|\alpha_L - \alpha_F|}{\alpha_F} < 1.0 ,$$ (see table 1).

It would have been obvious to one having ordinary skill in the art to modify the teachings of Naruse et al with the teachings of Ito et al to prevent stress concentration upon the bonded portions and for thermal shock resistance (see Ito et al reference page 2, 11th paragraph).

Regarding claim 2, the Naruse et al reference teaches a honeycomb filter for purifying exhaust gases which has a structure in which: a plurality of a columnar porous ceramic member are combined with one another through adhesive layer, each of said columnar porous ceramic member comprising a number of through holes that are placed in parallel with one another in the length direction with partition wall interposed

therebetween; and said partition wall which separates said through holes functions as a filter for collecting particulates (see Abstract and column 7, 4th paragraph).

The Naruse reference does not teach a coating material layer formed on the circumferential face of said ceramic block wherein the relationship between a thermal expansion coefficient α_L of said adhesive layer and a thermal expansion coefficient α_F of said porous ceramic number is as follows:

$$0.01 < \frac{|\alpha_L - \alpha_F|}{\alpha_F} < 1.0 .$$

The Ito et al reference does teach a coating material layer formed on the circumferential face of said ceramic block wherein the relationship between a thermal expansion coefficient α_L of said adhesive layer and a thermal expansion coefficient α_F of said porous ceramic number is as follows:

$$0.01 < \frac{|\alpha_L - \alpha_F|}{\alpha_F} < 1.0$$, (see Abstract and table 1).

It would have been obvious to one of ordinary art in the art at the time the invention was made to modify the teachings of Naruse et al with the teachings of Ito et al to protect the honeycomb structure from cracking since the coating would reinforce the periphery of the honeycomb structure and for thermal shock resistance.

Regarding claim 3, Naruse et al teaches a honeycomb filter for purifying exhaust gases which has a structure in which: a plurality of a columnar porous ceramic member are combined with one another through adhesive layer to constitute a ceramic block, said ceramic block each of said columnar porous ceramic member comprising a number of through holes that are placed in parallel with one another in the length direction with

partition wall interposed therebetween; and said partition wall which separates said through holes functions as a filter for collecting particulates (see Abstract and column 7, 4th paragraph).

The Naruse et al reference does not teach a coating material layer formed on the circumferential face of said ceramic block wherein the relationship between the thermal expansion coefficient α_L of the adhesive layer and the thermal expansion coefficient α_F of the porous ceramic member are as follows:

$$0.01 < \frac{|\alpha_L - \alpha_F|}{\alpha_F} < 1.0,$$

and the relationship between the thermal expansion coefficient α_M of the coating material layer and the thermal expansion coefficient α_F of the porous ceramic member are as follows:

$$0.01 < \frac{|\alpha_M - \alpha_F|}{\alpha_F} < 1.0.$$

The Ito et al reference does teach a coating material layer formed on the circumferential face of said ceramic block wherein the relationship between the thermal expansion coefficient α_L of the adhesive layer and the thermal expansion coefficient α_F of the porous ceramic member are as follows:

$$0.01 < \frac{|\alpha_L - \alpha_F|}{\alpha_F} < 1.0,$$

and the relationship between the thermal expansion coefficient α_M of the coating material layer and the thermal expansion coefficient α_F of the porous ceramic member are as follows:

, $0.01 < \frac{|\alpha_M - \alpha_F|}{\alpha_F} < 1.0$ (see Abstract and table 1).

It would have been obvious to one of ordinary art in the art at the time the invention was made to modify the teachings of Naruse et al with the teachings of Ito et al to protect the honeycomb structure from cracking since the coating would reinforce the periphery of the honeycomb structure and for thermal shock resistance.

Regarding claim 9, the Naruse et al reference teaches a honeycomb filter for purifying exhaust gases which has a structure in which: a plurality of a columnar porous ceramic member are combined with one another through adhesive layer, each of said columnar porous ceramic member comprising a number of through holes that are placed in parallel with one another in the length direction with partition wall interposed therebetween; and said partition wall which separates said through holes functions as a filter for collecting particulates (see Abstract and column 7, 4th paragraph).

The Naruse et al reference does not teach wherein the adhesive layer is made of the adhesive according to claim 7.

The Ito et al reference does teach wherein the adhesive layer is made of the adhesive according to claim 7 (see page 3, 4th paragraph).

It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the teachings of Naruse et al with the teachings of Ito et al to achieve the desired thermal expansion coefficient and Young's modulus of the bonding material for thermal shock resistance (see Ito et al page 3, 3rd and 4th paragraphs).

Regarding claim 10, the Naruse et al reference teaches a honeycomb filter for purifying exhaust gases which has a structure in which: each of said columnar porous ceramic member comprising a number of through holes that are placed in parallel with one another in the length direction with partition wall interposed therebetween; and said partition wall which separates said through holes functions as a filter for collecting particulates (see Abstract and column 7, 4th paragraph).

The Naruse et al reference does not teach a coating material layer is formed on the circumferential face of a ceramic block which comprises at least one of a columnar porous ceramic member.

The Ito et al reference does teach a coating material layer is formed on the circumferential face of a ceramic block which comprises at least one of a columnar porous ceramic member (see Abstract and page 2, 10th paragraph).

The Ito et al reference teaches that the adhesive material may be used as a coating such that the adhesive and coating materials are the same (see page 2, 10th paragraph).

It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the teaching of Naruse et al with the teachings of Ito et al to reinforce the honeycomb structure with a coating on the circumferential face of the ceramic structure.

Because the materials of the coating and adhesive in the claimed invention are the same as the materials of the adhesive and the porous honeycomb structure taught in Naruse et al, the Naruse et al and Ito et al references also teach the limitation that the

coating material layer has a thermal capacity per unit volume that is lower than the thermal capacity per unit volume of the porous ceramic member.

Claims 11 and 12 depend on claim 10 such that the reasoning used to reject claim 10 is used to reject the dependent portions of the claims.

Regarding claim 11, because the materials of the coating and adhesive in the claimed invention are the same of the materials of the adhesive and the porous honeycomb structure taught in Naruse et al, the Naruse et al and Ito et al references also teach the limitation that the coating material layer is set to 90% or less of the thermal capacity per unit volume of the porous ceramic member.

Regarding claim 12, because the materials of the coating and adhesive in the claimed invention are the same of the materials of the adhesive and the porous honeycomb structure taught in Naruse et al, the Naruse et al and Ito et al references also teach the limitation that the coating material layer is set to 20% or more of the thermal capacity per unit volume of the porous ceramic member.

Regarding claim 15, the Naruse et al reference teaches a honeycomb filter for purifying exhaust gases which has a structure in which: comprises at least one of a columnar porous ceramic member, each of said columnar porous ceramic member comprising a number of through holes that are placed in parallel with one another in the length direction with partition wall interposed therebetween The Naruse et al reference does not teach a coating material layer is formed on the circumferential face of a ceramic block wherein said coating material layer is formed by using the coating material according to claim 13.

The Ito et al reference does teach a coating material layer is formed on the circumferential face of a ceramic block wherein said coating material layer is formed by using the coating material according to claim 13 (see Abstract, page 2, 10th paragraph, and page 3, 4th paragraph).

It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify teachings of Naruse et al with the teachings of Ito et al to reinforce the honeycomb structure with a coating on the circumferential face of the ceramic structure.

Regarding claim 16, Naruse et al teaches a honeycomb filter for purifying exhaust gases which has a structure in which: a plurality of a columnar porous ceramic member are combined with one another through adhesive layer to constitute a ceramic block, each of said columnar porous ceramic member comprising a number of through holes that are placed in parallel with one another in the length direction with partition wall interposed therebetween; and said partition wall which separates said through holes functions as a filter for collecting particulates (see Abstract and column 7, 4th paragraph).

The Naruse does not teach a coating material layer is formed on the circumferential face of said ceramic block.

The Ito et al reference does teach a coating material layer is formed on the circumferential face of said ceramic block (see Abstract and page 2, 10th paragraph).

The Ito et al reference teaches that the adhesive material may be used as a coating such that the adhesive and coating materials are the same (see page 2, 10th paragraph).

It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the teaching of Naruse et al with the teachings of Ito et al to reinforce the honeycomb structure with a coating on the circumferential face of the ceramic structure.

Because the materials of the coating and adhesive in the claimed invention are taught to be the same as the materials of the adhesive and the porous honeycomb structure taught in Naruse et al, the Naruse et al and Ito et al references also teach the limitation that the coating material layer has a thermal capacity per unit volume that is lower than the thermal capacity per unit volume of the porous ceramic member.

Claims 17 and 18 depend on claim 16 such that the reasoning used to reject claim 16 is used to reject the dependent portions of the claims.

Regarding claim 17, because the materials of the coating and adhesive of the claimed invention are the same as the materials of the adhesive and the porous honeycomb structure taught in Naruse et al, the Naruse et al and Ito et al references also teach the limitation that the coating material layer is set to 90% or less of the thermal capacity per unit volume of the porous ceramic member.

Regarding claim 18, because the materials of the coating and adhesive of the claimed invention are the same as the materials of the adhesive and the porous honeycomb structure taught in Naruse et al, the Naruse et al and Ito et al references

also teach the limitation that the coating material layer is set to 20% or more of the thermal capacity per unit volume of the porous ceramic member.

Regarding claim 19, the Naruse et al reference teaches a honeycomb filter for purifying exhaust gases which has a structure in which: a plurality of a columnar porous ceramic member are combined with one another through adhesive layer to constitute a ceramic block, a coating material layer is formed on the circumferential face of said ceramic block each of said columnar porous ceramic member comprising a number of through holes that are placed in parallel with one another in the length direction with partition wall interposed therebetween; and said partition wall which separates said through holes functions as a filter for collecting particulates (see Abstract and column 7, 4th paragraph).

The Naruse et al reference does not teach the adhesive layer is formed by using the adhesive disclosed in claim 7, and the coating material layer is formed by using a coating material that is capable of forming independent pores.

The Ito et al reference does teach the adhesive layer is formed by using the adhesive disclosed in claim 7, and the coating material layer is formed by using a coating material that is capable of forming independent pores (see Abstract, page 2, 10th paragraph, and page 3, 4th paragraph).

It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the teaching of Naruse et al with the teachings of Ito et al to the adjust the Young's modulus which is a factor in thermal shock resistance see Ito et al page 3, 3rd and 4th paragraphs).

Claim 20 depends on claim 1 such that the reasoning used to reject claim 1 will be use to reject the dependent portion of the claim.

Regarding claim 20, the Naruse et al reference teaches the honeycomb filter is a catalyst support (see column 7, 4th paragraph).

Regarding claim 21, the Naruse et al reference teaches a manufacturing method of a honeycomb filter for purifying exhaust gases which has a structure in which: a plurality of a columnar porous ceramic member are combined with one another through adhesive layer to form a ceramic laminated body, and said ceramic laminated body is subjected to a machining process to constitute a ceramic block, said ceramic block having a filled layer formed on the circumference part thereof each of said columnar porous ceramic member comprising a number of through holes that are placed in parallel with one another in the length direction with partition wall interposed therebetween; and said partition wall which separates said through holes functions as a filter for collecting particulates which comprises steps of: the coating material filling step, in which assuming that a border line formed by an end face of a ceramic block to be manufactured is superposed on an end face of said ceramic laminated body formed by combining a plurality of the porous ceramic members with one another through the adhesive layer, the through holes of the porous ceramic member that crosses the border line is filled with a material; and the ceramic block manufacturing process, in which the ceramic laminated body filled with material is subjected to a machining process so that a ceramic block is manufactured (see Abstract; column 7, 4th, 6th and 7th paragraphs; and column 8, 1st and 2nd paragraphs).

The Naruse et al reference does not teach a coating material used to fill the through holes of the porous ceramic member that crosses the border line is filled with a coating material and that the coating material is used in the manufacture of the ceramic structure.

The Ito et al reference teaches a coating material bonded to the circumferential face of the honeycomb structure (see Abstract and page 2, 10th paragraph).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the teachings of Naruse et al with the teachings of Ito et al such that the plugged cell of the Naruse et al reference are filling with the coating material and only in the circumferential cells to reinforce the border of the structure as a preventive cracking measure.

Claims 4-6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Naruse et al (US 5,914,187 in view of Ito et al (EP 0 362 883 A1).

Regarding claim 4, the Naruse et al reference teaches a honeycomb filter for purifying exhaust gases which has a structure in which: a plurality of a columnar porous ceramic member are combined with one another through adhesive layer, each of said columnar porous ceramic member comprising a number of through holes that are placed in parallel with one another in the length direction with partition wall interposed therebetween; and said partition wall which separates said through holes functions as a filter for collecting particulates (see Abstract; column 3, 8th and 9th paragraphs; column 7, 4th and 6th paragraphs).

Because the materials of the adhesive and the porous honeycomb structure taught in Naruse et al are also taught in the invention, Naruse et al also teaches the limitation that the adhesive layer has a thermal capacity per unit volume that is lower than the thermal capacity per unit volume of the porous ceramic member.

Claims 5 and 6 depend on claim 4 such that the reasoning used to reject claim 4 is used to reject the dependent portions of the claims.

Regarding claim 5, the Naruse et al reference teaches the honeycomb filter for purifying exhaust gas (see Abstract; column 3, 8th and 9th paragraphs; column 7, 4th and 6th paragraphs).

Because the materials of the adhesive and the porous honeycomb structure taught in Naruse et al are also taught in the invention, Naruse et al also teaches the limitation that the adhesive layer is set to 90% or less of the thermal capacity per unit volume of the porous ceramic member.

Regarding claim 6, the Naruse et al reference teaches the honeycomb filter for purifying exhaust gas (see Abstract; column 3, 8th and 9th paragraphs; column 7, 4th and 6th paragraphs).

Because the materials of the adhesive and the porous honeycomb structure taught in Naruse et al are also taught in the invention, Naruse et al also teaches the limitation that the adhesive layer is set to 20% or more of the thermal capacity per unit volume of the porous ceramic member.

Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. US 5,445,786, US 5,567,663, and US 4,451,517.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Natasha Young whose telephone number is 571-270-3163. The examiner can normally be reached on Mon-Thurs 7:30am-6:00pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Walter Griffin can be reached on 571-272-1447. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

NY

Walter D. Griffin

WALTER D. GRIFFIN
SUPERVISORY PATENT EXAMINER